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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/937,912	01/24/2002	Mustafa Akram	H 3933 PCT/US	7117

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EXAMINER

ELHILO, EISA B

ART UNIT	PAPER NUMBER
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1751

DATE MAILED: 09/30/2003

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Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

09/937,912

Applicant(s)

AKRAM ET AL.

Examiner

Eisa B Elhilo

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 24 January 2002.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 14-32 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) 14-32 is/are allowed.
- 6) ☒ Claim(s) \_\_\_\_\_ is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

### Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                                  | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____  |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                         | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) <u>3</u> . | 6) <input type="checkbox"/> Other:  |

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Claims 14-32 are pending in this application.

### **DETAILED ACTION**

1 This action is responsive to the supplemental amendment filed on January 24, 2002.

2 The cancellation of claims 1-13 is acknowledged. Pending claims are 14-32.

### ***Claim Rejections - 35 USC § 103***

3 The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 14-23 and 26-32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hawkins et al. (US 5,843,193) in view of Akram et al. (US 5,494,489).

Hawkins (US' 193) teaches a hair dyeing composition comprising cationic conditioning of quaternary ammonium salts as claimed in claims 14 and 17 (see col. 9, lines 50-67 and col. 10, lines 1-14), dye precursors as claimed in claims 14 and 23 (primary intermediates) (see col. 2, lines 17-67), anionic tensides (anionic surfactants) of water soluble soaps as claimed in claims 15 and 16 (see col. 7, line 9), cationic polymers of quaternary derivative of cellulose as claimed in claims 18, 19 and 27 (see col. 10, lines 56-60), silicone fluids (oil) as claimed in claim 22 (see col. 12, line 21) and hydrolyzed protein as claimed in claim 21 (see col. 14, Example 1).

Hawkins also teaches a method for dyeing hair comprising applying to the hair the dyeing composition as described above, wherein the method is similar to the claimed method as claimed in claims 28-32 (see col. 14, lines 1-23).

The instant claims differ from the reference by reciting a composition comprising a quaternary ammonium phospholipids compounds of the claimed formula (I) in which R is represented by the claimed formula (II). Also, the reference does not teach or disclose the compounds that represented the claimed formula (I) as claimed in claims 26 and 31. Further, the reference does not teach a cationic polymer of polyquaternium-2 as claimed in claim 20.

However, the primary reference teaches a dyeing composition that comprises cationic conditioning such as polyquaternium 10 and quaternary ammonium salts (see col. 10, lines 56-65).

Akram (US' 489) in analogous art of hair dyeing composition, teaches a composition comprising tris(3-N,N-dimethyl-N-linolenamidopropyl-2-hydroxyammoniumpropyl) phosphoric acid ester-trichloride (Phospholipids EFA) (described in U.S. Pat. No. 4,209,449 incorporated herein by reference) (see col. 3, lines 61-64) wherein the reference's compound may represented by a formula similar the claimed formula (I), when in the claimed formula (I), Y is 0, A is oxy-2-hydroxypropyl (-O-CH<sub>2</sub>-CHOH-CH<sub>2</sub>-) and R<sup>3</sup> is monounsaturated C<sub>8</sub> to C<sub>18</sub> acyl radical and when in the reference the compound of tris(3-N,N-dimethyl-N-linolenamidopropyl-2-hydroxyammoniumpropyl)phosphoric acid ester-trichloride (Phospholipids EFA) represents 2-hydroxypropyl radical attached from one side to a quaternary ammonium radical carrying two methyl radicals and a tertiary amine radical having monounsaturated C<sub>18</sub> acyl radical to form a linolenamide group and attached from other side to a phosphoric radical.

Therefore, In view of the teaching of the secondary reference, one having ordinary skill in the art at the time the invention was made would be motivated to modify the composition of the primary reference by incorporating the tris(3-N,N-dimethyl-N-linolenamidopropyl-2-

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hydroxyammoniumpropyl) phosphoric acid ester-trichloride (Phospholipids EFA) as taught by Akram to make such a composition with a reasonable expectation of success. Such modification would be obvious because the primary reference suggests the use of the cationic conditioning of a polymeric quaternary ammonium salts (see col. 10, lines 56-64) and the secondary reference teaches clearly the use of Phospholipid compounds in the hair colorant composition succeeds in achieving an improvement in the area of wet-combing behavior by 48% (see col. 4, lines 48-53), and, thus, a person of the ordinary skill in the art would be motivated to incorporate the phospholipids compounds in the hair dyeing composition in order to improve the wet-combing behavior, absent, unexpected results.

With respect to claim 20 it would have been obvious to one having ordinary skill in the art at the time the invention was made to make such a composition by incorporating the cationic polymer of polyquaternium-2 in the composition of the primary reference because the primary reference teaches a hair dyeing composition comprising a cationic polymer of polyquaternium-10 as a cationic conditioning agent (see col. 10, line 62), and, thus, a person of an ordinary skill in the art would expect such a composition to have similar properties to those claimed, absent unexpected results.

4 Claims 24 and 25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hawkins et al. (US 5,843,193) in view of Akram et al. (US 5,494,489) and further in view of Cotteret et al. (US 5,580,357).

The disclosures of Hawkins (US' 193) and Akram (US' 489) are summarized above. The references do not teach or disclose at least one indole derivatives or indoline derivatives as

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claimed in claim 24. The references also do not teach at least one substantive dye or natural dye as claimed in claim 25.

However, the primary reference of Hawkins (US' 193) teaches a dyeing composition comprising that may comprise a number of dyeing ingredients (primary intermediates and couplers) (see col. 2, lines 21-67 and col. 3, lines 10-55) and the secondary reference of Akram (US' 489) teaches a colorant composition comprising one or more developers, one or more couplers and direct absorbing dyes (see col. 2, lines 11-12 and lines 15-27).

Cotteret (US' 357) in other analogous art of hair dyeing composition, teaches a composition comprising indole derivatives as claimed in claim 24 (see col. 4, line 5) and substantive dyes such as azo or anthroquinone dyes as claimed in claim 25 (see col. 4, lines 8-9).

Therefore, in view of the teaching of the secondary reference, one having ordinary skill in the art at the time the invention was made to be motivated to modify the composition of the primary reference by incorporating the indole derivatives and the substantive dyes as taught by Cotteret to make such a composition with a reasonable expectation of success. Such modification would be obvious because the reference of Cottert teaches that other coupling agents (indole derivatives) and/or direct dyes (substantive dyes) are used in the composition in particular to tinting or enriching with glints the colors provided by the oxidation dye precursors (see col. 3, lines 63-67), and, thus, a person of the ordinary skill in the art would be motivated to incorporate these dyeing ingredients of indole derivatives and/or substantive dyes in the hair dyeing composition in order to enrich the color with glints, and would expect such a composition to have similar properties to those claimed, absent unexpected results.

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*Conclusion*

The remaining references listed on form 1449 have been reviewed by the examiner and are considered to be cumulative to or less material than the prior art references relied upon in the rejection above.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Eisa B Elhilo whose telephone number is (703) 305-0217. The examiner can normally be reached on M - F (7:30-5:00) with alternate Friday off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Yogendra Gupta can be reached on (703) 308-0661. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.



Eisa Elhilo  
Patent Examiner  
Art Unit 1751

September 16, 2003